



**UNITED STATES ENVIRONMENTAL PROTECTION AGENCY  
REGION III  
1650 Arch Street  
Philadelphia, Pennsylvania 19103-2029**

**JUN 27 2013**

Mr. Richard Weeks, Acting Director  
Division of Stormwater Management  
Virginia Department of Conservation and Recreation  
900 East Main Street, 8<sup>th</sup> Floor  
Richmond, Virginia 23219

Re: Specific Objection to Chesterfield County Phase I Municipal Separate Storm Sewer System (MS4)  
Permit VA0088609

Dear Mr. Weeks:

On March 29, 2013, the U. S. Environmental Protection Agency (EPA or the Agency), received a draft of the above-referenced National Pollutant Discharge Elimination System (NPDES) permit (Chesterfield County permit). EPA has reviewed the permit pursuant to 40 C.F.R. § 123.44 and the Memorandum of Agreement (MOA) between EPA Region III and the Virginia State Water Control Board (1975) (as well as subsequent agreements).

In April 2013, EPA informed the Virginia Department of Conservation and Recreation (DCR) and the Virginia Department of Environmental Quality (DEQ) that its concerns with the draft Phase I MS4 permit for Prince William County also applied to the draft Chesterfield County permit. On April 25, 2013, EPA issued a time extension letter to increase the Agency's review time to 90 days since we had reason to believe that the comments would not be addressed within the initial 30-day review period. EPA, DCR and DEQ are currently in discussions on these issues. While EPA, DCR and DEQ have agreed in principle on the resolution of several issues, one major issue remains -- clarification of the roles of Chesterfield County (the County) and the Virginia Department of Transportation (VDOT) in meeting the permit requirements. There are also secondary issues that still need to be resolved. Since these discussions are ongoing and the 90-day review period will expire on June 27, 2013, EPA is issuing this specific objection to the issuance of the referenced permit pursuant to 40 C.F.R. §§ 123.44(b)(1) and (c)(1) and Section III.A.2 of the MOA. As further explained herein, EPA believes that the Chesterfield County permit fails to incorporate several substantive requirements for MS4 permits, as required by the federal Clean Water Act, 33 U.S.C. §§ 1251 *et seq.* (CWA), and its implementing regulations.

EPA's objection to the draft permit and identification of revisions that are needed before EPA can remove the objection, *see* 40 C.F.R. § 123.44(b)(2)(ii), are described below:

## **1. MS4 Permit Coverage**

All discharges from MS4s located in identified large and medium MS4s jurisdictions are required to have permit coverage. *See* 40 C.F.R. § 122.26(a)(3)(i). The current draft permit is insufficient to authorize all discharges from the MS4 (or MS4s) serving the County, despite the requirement for coverage. The permit applies to “discharges to surface waters from the Municipal Separate Storm Sewer System (MS4) owned or operated by the Chesterfield County in Virginia”<sup>1</sup> (as well as to four categories of separate or commingled discharges through the MS4). As written, however, the permit does not provide authorization for discharges of pollutants from the MS4 within Chesterfield County that are owned or operated by VDOT.

EPA believes this lack of NPDES permit coverage for VDOT in this draft permit is based on DCR and DEQ’s assumption that VDOT’s discharges will be covered under the state’s General Permit for Discharges of Stormwater from Small Municipal Separate Storm Sewer Systems (small MS4 GP, or Phase II MS4 GP) (to be effective July 1, 2013). It is hard to conceive how MS4s located in the County – a Phase I jurisdiction -- can receive coverage under the small MS4 GP; those systems do not meet the definition of a “small MS4” but are instead defined as “medium” or “large” MS4s. *See* 40 C.F.R. § 122.26(b)(4), (7), (8), (16)(ii). From a policy perspective, requiring Phase I MS4 coverage for all VDOT-owned stormwater conveyances within the County is expected to minimize confusion over conveyance ownership since the Phase I permit would cover all such conveyances in the MS4.

Given the need for permit coverage for VDOT’s discharges within the County, the regulations provide several options for how those permits may be structured, including the issuance of “one system-wide permit covering all discharges from [MS4s] within a large or medium municipal storm sewer system” or by issuing “distinct permits for appropriate categories of discharges within a large or medium [MS4].” *See* 40 C.F.R. § 122.26(a)(3)(ii). To the extent that Virginia chooses to issue one permit for the discharges within the County, the Preamble to the EPA Phase I Rule for Stormwater Discharges supports this option: one purpose of the regulations is to resolve issues associated with MS4 dischargers not having the legal authority to implement land use controls (e.g., DOTs) or not having ownership of conveyances (e.g., localities in instances where DOTs own conveyances). *See* 55 Fed. Reg. 47990, 48041 (November 16, 1990).

Consequently, in order to resolve this portion of the objection for the Chesterfield County MS4 permit, as well as to avoid the need for future objections with regard to the remaining Phase I MS4 permits in Virginia, EPA has offered Virginia the following options for extending Phase I MS4 permit coverage to VDOT facilities and conveyances located within Phase I MS4 jurisdictions:

1. DCR or DEQ may issue VDOT 11 individual Phase I MS4 permits covering its activities, including the discharge of pollutants, within each traditional Phase I MS4 jurisdiction within the state;

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<sup>1</sup> The Permit also applies to “Non-stormwater discharges and stormwater discharges associated with industrial activity (defined at 9 VAC 25-31-10) that are authorized by a separate Virginia Pollutant Discharge Elimination System (VPDES) permit; [d]ischarges from construction activities that are regulated under the Virginia Stormwater Management Program (VSMP) (4VAC 50-60-10 et. seq.) and authorized by a separate VSMP Permit; [certain types of] non-stormwater discharges unless the State Water Control Board or the Virginia Soil and Water Conservation Board determine the discharge to be a significant source of pollutants to surface waters; and discharge of material resulting from a spill [that] is necessary to prevent loss of life, personal injury, or severe property damage. . . .”

2. DCR or DEQ may issue VDOT one individual Phase I MS4 permit covering its systems for all areas of the Commonwealth statewide that are located within Phase I MS4 jurisdictions. Under this option, VDOT would still need Phase II permit coverage for stormwater conveyances that meet the definition of "small MS4" under 40 C.F.R. § 122.26(b)(16);
3. DCR or DEQ may add VDOT as a co-permittee to traditional Phase I MS4 permits, *i.e.*, together with the County. Under this option, VDOT would still need Phase II permit coverage for stormwater conveyances that meet the definition of "small MS4" under 40 C.F.R. § 122.26(b)(16); or
4. DCR or DEQ may issue one individual state-wide MS4 permit that covers all VDOT conveyances both within and outside Phase I jurisdictions.

Regardless of which option DCR or DEQ chooses, any permit issued to VDOT must include provisions specific to its operations, including:

- Permit provisions which reflect the unique and distinct aspects of VDOT operations in contrast to the activities of traditional MS4 permittees;
- Requirements for how localities and VDOT will plan, communicate and coordinate responsibilities (including funding, retrofit, and/or rebuilding projects) when County and VDOT systems are interconnected or when runoff from the County drains into the VDOT system;
- An indication as to who is responsible (and thus liable for any violations) for reducing loads from areas draining to a VDOT stormwater conveyance system, given that VDOT owns and operates the system but the County has the authority to implement land use controls such as ordinances; and
- Permit provisions that are clear, equitable and enforceable, and that apply to the traditional MS4 as well as to VDOT (*e.g.*, identify specific permit provisions that are applicable to one or more permittees or co-permittees) within the Phase I MS4.

As an aside, EPA notes that while the issue of VDOT coverage arose in EPA's review of the draft Prince William County Permit, it did not arise during our agencies' discussions on the Arlington County Permit. This is because Arlington County owns and operates the majority of roads within its borders. In contrast, VDOT owns and maintains the majority of roads in Chesterfield and Prince William Counties.

If DCR or DEQ prefers to resolve the objection to the Chesterfield County MS4 permit without resolving the other Phase I VDOT coverage issues for all VDOT systems within Phase I localities, EPA would also accept issuance of a separate individual permit for VDOT activities within the Chesterfield County MS4 (Option 1 above) or issuance of a permit with VDOT as a co-permittee along with Chesterfield County (Option 3).

## **2. Limitations on Stormwater Management Planning Provisions**

The draft permit for Chesterfield County is also problematic in that it does not include sufficient requirements for the County to perform planning. Part I.B.1 of the draft permit limits stormwater management planning activities to the evaluation of projects "within County easements, right-of-ways, and properties for implementation during the term of this permit." However, federal regulations call for, "a comprehensive planning process... to reduce the discharge of pollutants to the maximum extent

practicable” and do not limit projects to within County easements and right-of-ways. *See* 40 C.F.R. §122.26(d)(2)(iv).

In order to resolve this portion of the objection, DCR or DEQ must revise Part I.B.1 as follows, “No later than 12-months after the effective date of this permit, the permittee shall submit to the Department, a Storm Water Capital Improvement Plan including cost-benefit analyses for projects within the County that must be implemented ~~within County easements, right-of-ways, and properties~~ during the term of this permit.”

### **3. Compliance with the Maximum Extent Practicable Standard**

Municipal permittees are required to reduce the discharge of pollutants from their systems to the “maximum extent practicable” (MEP). *See* 33 U.S.C. § 1342(p)(B)(iii) (“Permits for discharges from municipal storm sewers . . . shall require controls to reduce the discharge of pollutants to the maximum extent practicable. . . .”); *see also* 40 C.F.R. §122.34(a) (“Your NPDES MS4 permit will require at a minimum that you develop, implement, and enforce a storm water management program designed to reduce the discharge of pollutants from your MS4 to the maximum extent practicable (MEP), to protect water quality, and to satisfy the appropriate water quality requirements of the Clean Water Act.”) Permitting authorities have the obligation to write permits with clear, enforceable and measurable provisions, and it is the responsibility of the permitting authority to develop appropriate requirements, including the determination of what requirements are necessary to achieve MEP. EPA hereby objects to Part 1.B.2(c) of the draft Chesterfield County MS4 permit because it fails to require the discharger to achieve the MEP standard for retrofit projects. Further, the fact sheet supporting the permit fails to evaluate whether the specific retrofit projects would be adequate and appropriate to satisfy the MEP standard.

In order to withdraw this portion of the objection, DCR must revise Part 1.B.2.(c) as follows:

“From the Storm Water Capital Improvement Plan required in Part I.B.1, the permittee shall select no less than ~~five~~seven projects for completion no later than 60 months after the effective date of this permit. The permittee shall submit a summary of the projects selected for implementation and proposed schedule ~~and project status updates to the Department as part of the annual report for the review and approval of the Department to ensure that the projects will reduce pollutants to the maximum extent practicable (MEP). The Department may request additional projects if the seven selected projects do not meet the MEP standard.~~

“The permittee shall submit a status of the selected projects and updated schedule for implementation to the Department with each annual report. The permittee may substitute alternative retrofit projects if opportunity exists provided that similar screening is applied to the substituted project as that in the watershed retrofit plans and that the alternative projects are also reviewed and approved by the Department.

“The permittee shall track the number of retrofit projects, type of land use being retrofitted, total acreage retrofitted and retrofit type by the watershed identified in the retrofit study and location by latitude and longitude in hours, minutes and seconds so that it is possible to calculate the pollutant reductions associated with the project.”

Similarly, the fact sheet must be revised to state:

"Part I.B.2.c) Retrofitting on Prior Developed Lands - 4VAC50-60-380 C.2.d(1)(d): As required in Part I.B.1 of the permit, the permittee must identify and prioritize Storm Water Capital Improvement projects related to pollutant reduction in order to work toward reducing pollutants to the maximum extent practicable (MEP). Based on the prioritized list, the permittee willshall select fiveseven of these projects for implementation prior to expiration of the permit. The Department will review, provide comments, and approve the proposed projects for implementation to ensure that the projects will reduce pollutants to the MEP. The Department may request additional projects if the seven selected projects do not meet the MEP standard. After approval, the permittee will proceed with implementation of the projects such that they are completed prior to the expiration of the permit. In determining MEP, the Department will consider land use of area draining to proposed BMPs; pervious and impervious acreage; downstream receiving water and channel conditions; holistic benefits of retrofits, watershed improvement plans, and/or engineered structures; the estimated pollutant reductions; and cost of pollutant reductions. With each annual report, the permittee will provide a status update of those selected projects. The permit allows the permittee to substitute alternative projects if opportunity exists provided that similar screening is applied to the substituted project as that in the watershed retrofit plans and that the alternative projects are also reviewed and approved by the Department. After approval, the permittee willshall proceed with implementation of the projects such that they are completed prior to the expiration of the permit. With each annual report, the permittee willshall provide a status update of those selected projects. For each project, the permittee willshall track the number of retrofit projects, type of land use being retrofitted, total acreage retrofitted and retrofit type by the watershed identified in the retrofit study and location so that it is possible to calculate the pollutant reductions associated with the project."

EPA recommends that DCR make the retrofit provisions within the draft Chesterfield County permit comparable to the draft Phase I MS4 permit for Arlington County submitted to EPA on January 22, 2013. EPA is pleased that DCR has expressed a willingness to make the changes, and we look forward to reviewing a revised draft permit and fact sheet with these changes prior to withdrawing our objection.

#### **4. Proper Maintenance**

All NPDES permittees, including MS4 operators, are required to properly operate and maintain all facilities and systems of treatment and control at all times. See 40 C.F.R. § 122.41(e). EPA objects to the draft permit because, as written, it lacks provisions to ensure proper maintenance of stormwater management facilities.

In order to resolve this portion of the objection, DCR or DEQ must make the following changes. First, Virginia must revise Part I.B.2(b)(5) of the draft permit to read, "The permittee shall continue to require adequate long-term operation and annual maintenance of stormwater management facilities by the responsible party." This revision would make the maintenance provisions within the draft Chesterfield County permit comparable to the draft Phase I MS4 permits for Arlington and Prince William Counties.

Second, DCR or DEQ must further revise Part I.B.2.b)(5) of the draft permit to read, "If recorded maintenance instruments are not required for these facilities, the permittee shall develop a written strategy to address their long-term operation and maintenance no later than 12-months after the effective date of this permit. Such a strategy ~~may~~ shall include periodic inspections, homeowner outreach and education, maintenance agreements or other methods targeted at promoting the long term maintenance of such facilities." EPA is pleased that DCR has expressed a willingness to make the changes, and we look forward to reviewing a revised draft permit and fact sheet with these changes prior to withdrawing our objection.

Third, Part I.B.2.i)1) must be revised to read, "For stormwater management (SWM) facilities and easements maintained by the permittee and residential properties where SWM, BMP and Storm Drainage Systems qualify for County maintenance (excluding apartments and mobile home parks), the following conditions apply..." This revision would make the maintenance provisions within the draft Chesterfield County MS4 permit comparable in scope to the draft Phase I MS4 permits for Arlington and Prince William Counties.

Fourth, in order to specify maintenance provisions for stormwater management facilities that are not maintained by the permittee, Part I.B.2.i)2)(a)(1) needs to be revised to include the following language, "Beginning with the effective date of this permit, maintenance agreements may be used but are not required for stormwater control measures that are designed to treat stormwater runoff solely from the individual residential lot on which they are located provided that the permittee has developed and implemented a strategy to address maintenance of such stormwater management controls. Should the permittee choose a strategy other than a maintenance agreement, such a strategy shall be provided in writing no later than 12 months after the effective date of this permit and shall include periodic inspections, homeowner outreach and education, or other methods targeted at promoting the long term maintenance of such facilities." This revision would make the maintenance provisions within the draft Chesterfield County permit comparable to the draft Phase I MS4 permits for Arlington and Prince William Counties. Alternatively, the fact sheet could explain what other permit provisions apply to facilities not operated by the permittee and for which no maintenance agreements exist.

Finally, Part I.B.2.i) must be revised to include the following specific reporting requirements, "Each annual report shall include a list of activities including inspections performed and notifications of needed maintenance and repair of stormwater infrastructure not operated by the permittee." This revision would also make the maintenance provisions within the draft Chesterfield County permit comparable to the draft Phase I MS4 permits for Arlington and Prince William Counties.

## **5. Minimizing Discharges from Roadways**

Phase I MS4 permits must include a comprehensive plan to develop, implement and enforce controls to reduce discharges of pollutants to MS4s from areas of new development and significant redevelopment. See 40 C.F.R §122.26(d)(2)(iv)(A)(2). Further, Phase I MS4 permits must contain a description of practices for reducing the impact of MS4 discharges from public streets, roads and highways. See 40 C.F.R §122.26(d)(2)(iv)(A)(3). The draft permit does not include adequate provisions to address discharges from new roadways, which are a category of new development. In order to resolve this portion of the objection, Part I.B.2.d) must be revised to include, "Prior to approval of any

secondary road design, the permittee shall require that approved source controls have been installed to minimize discharge of pollutants from the roadways and that applicable long term maintenance agreements have been implemented." This addition would make the roadways provisions within the draft Chesterfield County permit comparable to the draft Phase I MS4 permits for Arlington and Prince William Counties.

**6. Outreach to Golf Courses**

Phase I MS4 permits must include a description of programs to reduce pollutants in discharges from MS4s associated with fertilizers and pesticides. These programs will include educational activities, as appropriate. *See* 40 C.F.R §122.26(d)(2)(iv)(A)(6). The draft permit does not include adequate provisions to address fertilizer and pesticide runoff from public and private golf courses. In order to resolve this portion of the objection, Part I.B.2.k(c) must be revised as follows: "~~Evaluate the development of~~Develop an outreach program with public and private courses golf courses located within the county that would implement integrated management practice (IMP) plans and techniques to reduce runoff of fertilizer and pesticides." This revision would make the education provisions within the draft Chesterfield County permit comparable to the draft Phase I MS4 permits for Arlington and Prince William Counties.

**7. Clarification of Director and Authorized Representative**

Federal regulations governing the NPDES programs specify that the Director means the the State Director of an approved program or an authorized representative. *See* 40 C.F.R §122.2. Given that the NPDES program governing MS4 discharges is transitioning from DCR to DEQ, the permit must be updated to reflect the appropriate Department and Board in order to resolve this portion of the objection.

EPA looks forward to continuing to work cooperatively with DCR and DEQ to resolve the remaining issues in an expeditious manner. EPA is currently in discussions with DCR and DEQ on other possible options to address our concerns about MS4 permit coverage and VDOT, in addition to the four choices identified above. Until the issues are resolved, however, neither DCR nor DEQ may issue the Chesterfield County MS4 permit without written authorization from EPA. *See* 40 C.F.R §122.4(c).

If you have any questions, please contact me, or Evelyn S. MacKnight, Chief, NPDES Permits Branch, at (215) 814-5717.

Sincerely,



Jon M. Capacasa, Director  
Water Protection Division

cc: Ginny Snead, DCR  
Melanie Davenport, DEQ  
Scott Smedley, Chesterfield County